SEQUENCE LISTING

<110> WEI, Ming-Hui et al.

<120> ISOLATED HUMAN ENZYME PROTEINS, NUCLEIC ACID MOLECULES ENCODING HUMAN ENZYME PROTEINS, AND USES THEREOF

<130> CL001201DIV

<150> To be Assigned
<151> 08-20-2003

<140> 09/820,004
<141> 03-29-2001

<160> 6

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            20                  25                  30
Gln Asp Ser Leu Ser Ser Ser Leu Lys Thr Cys Tyr Lys Tyr Leu Asn
        35                  40                  45
Gln Thr Ser Arg Ser Phe Ala Ala Val Ile Gln Ala Leu Asp Gly Glu
    50                  55                  60
Met Arg Asn Ala Val Cys Ile Phe Tyr Leu Val Leu Arg Ala Leu Asp
65                  70                  75                  80
Thr Leu Glu Asp Asp Met Thr Ile Ser Val Glu Lys Lys Val Pro Leu
                85                  90                  95
Leu His Asn Phe His Ser Phe Leu Tyr Gln Pro Asp Trp Arg Phe Met
            100                 105                 110
Glu Ser Lys Glu Lys Asp Arg Gln Val Leu Glu Asp Phe Pro Thr Ile
        115                 120                 125
Ser Leu Glu Phe Arg Asn Leu Ala Glu Lys Tyr Gln Thr Val Ile Ala
    130                 135                 140
Asp Ile Cys Arg Arg Met Gly Ile Gly Met Ala Glu Phe Leu Asp Lys
145                 150                 155                 160
His Val Thr Ser Glu Gln Glu Trp Asp Lys Tyr Cys His Tyr Val Ala
                165                 170                 175
Gly Leu Val Gly Ile Gly Leu Ser Arg Leu Phe Ser Ala Ser Glu Phe
            180                 185                 190
Glu Asp Pro Leu Val Gly Glu Asp Thr Glu Arg Ala Asn Ser Met Gly
        195                 200                 205
Leu Phe Leu Gln Lys Thr Asn Ile Ile Arg Asp Tyr Leu Glu Asp Gln
    210                 215                 220
Gln Gly Gly Arg Glu Phe Trp Pro Gln Glu Val Trp Ser Arg Tyr Val
225                 230                 235                 240
Lys Lys Leu Gly Asp Phe Ala Lys Pro Glu Asn Ile Asp Leu Ala Val
                245                 250                 255
Gln Cys Leu Asn Glu Leu Ile Thr Asn Ala Leu His His Ile Pro Asp
            260                 265                 270
Val Ile Thr Tyr Leu Ser Arg Leu Arg Asn Gln Ser Val Phe Asn Phe
        275                 280                 285
Cys Ala Ile Pro Gln Val Met Ala Ile Ala Thr Leu Ala Ala Cys Tyr
    290                 295                 300
Asn Asn Gln Gln Val Phe Lys Gly Ala Val Lys Ile Arg Lys Gly Gln
305                 310                 315                 320
Ala Val Thr Leu Met Met Asp Ala Thr Asn Met Pro Ala Val Lys Ala
                325                 330                 335
Ile Ile Tyr Gln Tyr Met Glu Glu Ile Tyr His Arg Ile Pro Asp Ser
            340                 345                 350
Asp Pro Ser Ser Ser Lys Thr Arg Gln Ile Ile Ser Thr Ile Arg Thr
        355                 360                 365
Gln Asn Leu Pro Asn Cys Gln Leu Ile Ser Arg Ser His Tyr Ser Pro
    370                 375                 380
Ile Tyr Leu Ser Phe Val Met Leu Leu Ala Ala Leu Ser Trp Gln Tyr
385                 390                 395                 400
Leu Thr Thr Leu Ser Gln Val Thr Glu Asp Tyr Val Gln Thr Gly Glu
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His
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Val Arg Phe Arg Ile Gly Gly Lys Arg Lys Val Met Pro Lys Met Asp
            20                  25                  30
Gln Asp Ser Leu Ser Ser Ser Leu Lys Thr Cys Tyr Lys Tyr Leu Asn
        35                  40                  45
Gln Thr Ser Arg Ser Phe Ala Ala Val Ile Gln Ala Leu Asp Gly Glu
    50                  55                  60
Met Arg Asn Ala Val Cys Ile Phe Tyr Leu Val Leu Arg Ala Leu Asp
65                  70                  75                  80
Thr Leu Glu Asp Asp Met Thr Ile Ser Val Glu Lys Lys Val Pro Leu
                85                  90                  95
Leu His Asn Phe His Ser Phe Leu Tyr Gln Pro Asp Trp Arg Phe Met
            100                 105                 110
Glu Ser Lys Glu Lys Asp Arg Gln Val Leu Glu Asp Phe Pro Thr Ile
        115                 120                 125
Ser Leu Glu Phe Arg Asn Leu Ala Glu Lys Tyr Gln Thr Val Ile Ala
    130                 135                 140
Asp Ile Cys Arg Arg Met Gly Ile Gly Met Ala Glu Phe Leu Asp Lys
145                 150                 155                 160
His Val Thr Ser Glu Gln Glu Trp Asp Lys Tyr Cys His Tyr Val Ala
                165                 170                 175
Gly Leu Val Gly Ile Gly Leu Ser Arg Leu Phe Ser Ala Ser Glu Phe
            180                 185                 190
Glu Asp Pro Leu Val Gly Glu Asp Thr Glu Arg Ala Asn Ser Met Gly
        195                 200                 205
Leu Phe Leu Gln Lys Thr Asn Ile Ile Arg Asp Tyr Leu Glu Asp Gln
    210                 215                 220
Gln Gly Gly Arg Glu Phe Trp Pro Gln Glu Val Trp Ser Arg Tyr Val
225                 230                 235                 240
Lys Lys Leu Gly Asp Phe Ala Lys Pro Glu Asn Ile Asp Leu Ala Val
                245                 250                 255
Gln Cys Leu Asn Glu Leu Ile Thr Asn Ala Leu His His Ile Pro Asp
            260                 265                 270
Val Ile Thr Tyr Leu Ser Arg Leu Arg Asn Gln Ser Val Phe Asn Phe
        275                 280                 285
Cys Ala Ile Pro Gln Val Met Ala Ile Ala Thr Leu Ala Ala Cys Tyr
    290                 295                 300
Asn Asn Gln Gln Val Phe Lys Gly Ala Val Lys Ile Arg Lys Gly Gln
305                 310                 315                 320
Ala Val Thr Leu Met Met Asp Ala Thr Asn Met Pro Ala Val Lys Ala
                325                 330                 335
Ile Ile Tyr Gln Tyr Met Glu Glu Ile Tyr His Arg Ile Pro Asp Ser
            340                 345                 350
Asp Pro Ser Ser Ser Lys Thr Arg Gln Ile Ile Ser Thr Ile Arg Thr
        355                 360                 365
Gln Asn Leu Pro Asn Cys Gln Leu Ile Ser Arg Ser His Tyr Ser Pro
    370                 375                 380
Ile Tyr Leu Ser Phe Val Met Leu Leu Ala Ala Leu Ser Trp Gln Tyr
385                 390                 395                 400
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Leu Thr Thr Leu Ser Gln Val Thr Glu Asp Tyr Val Gln Thr Gly Glu
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His
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<211> 417
<212> PRT
<213> Human

<400> 6

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Val Arg Phe Arg Ile Gly Gly Lys Arg Lys Val Met Pro Lys Met Asp
            20                  25                  30
Gln Asp Ser Leu Ser Ser Ser Leu Lys Thr Cys Tyr Lys Tyr Leu Asn
        35                  40                  45
Gln Thr Ser Arg Ser Phe Ala Ala Val Ile Gln Ala Leu Asp Gly Glu
    50                  55                  60
Met Arg Asn Ala Val Cys Ile Phe Tyr Leu Val Leu Arg Ala Leu Asp
65                  70                  75                  80
Thr Leu Glu Asp Asp Met Thr Ile Ser Val Glu Lys Lys Val Pro Leu
                85                  90                  95
Leu His Asn Phe His Ser Phe Leu Tyr Gln Pro Asp Trp Arg Phe Met
            100                 105                 110
Glu Ser Lys Glu Lys Asp Arg Gln Val Leu Glu Asp Phe Pro Thr Ile
        115                 120                 125
Ser Leu Glu Phe Arg Asn Leu Ala Glu Lys Tyr Gln Thr Val Ile Ala
    130                 135                 140
Asp Ile Cys Arg Arg Met Gly Ile Gly Met Ala Glu Phe Leu Asp Lys
145                 150                 155                 160
His Val Thr Ser Glu Gln Glu Trp Asp Lys Tyr Cys His Tyr Val Ala
                165                 170                 175
Gly Leu Val Gly Ile Gly Leu Ser Arg Leu Phe Ser Ala Ser Glu Phe
            180                 185                 190
Glu Asp Pro Leu Val Gly Glu Asp Thr Glu Arg Ala Asn Ser Met Gly
        195                 200                 205
Leu Phe Leu Gln Lys Thr Asn Ile Ile Arg Asp Tyr Leu Glu Asp Gln
    210                 215                 220
Gln Gly Gly Arg Glu Phe Trp Pro Gln Glu Val Trp Ser Arg Tyr Val
225                 230                 235                 240
Lys Lys Leu Gly Asp Phe Ala Lys Pro Glu Asn Ile Asp Leu Ala Val
                245                 250                 255
Gln Cys Leu Asn Glu Leu Ile Thr Asn Ala Leu His His Ile Pro Asp
            260                 265                 270
Val Ile Thr Tyr Leu Ser Arg Leu Arg Asn Gln Ser Val Phe Asn Phe
        275                 280                 285
Cys Ala Ile Pro Gln Val Met Ala Ile Ala Thr Leu Ala Ala Cys Tyr
    290                 295                 300
Asn Asn Gln Gln Val Phe Lys Gly Ala Val Lys Ile Arg Lys Gly Gln
305                 310                 315                 320
Ala Val Thr Leu Met Met Asp Ala Thr Asn Met Pro Ala Val Lys Ala
                325                 330                 335
Ile Ile Tyr Gln Tyr Met Glu Glu Ile Tyr His Arg Ile Pro Asp Ser
            340                 345                 350
Asp Pro Ser Ser Ser Lys Thr Arg Gln Ile Ile Ser Thr Ile Arg Thr
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```
        355                 360                 365
Gln Asn Leu Pro Asn Cys Gln Leu Ile Ser Arg Ser His Tyr Ser Pro
    370                 375                 380
Ile Tyr Leu Ser Phe Val Met Leu Leu Ala Ala Leu Ser Trp Gln Tyr
385                 390                 395                 400
Leu Ala Thr Leu Ser Gln Val Thr Glu Asp Tyr Val Gln Thr Gly Glu
                405                 410                 415
His
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